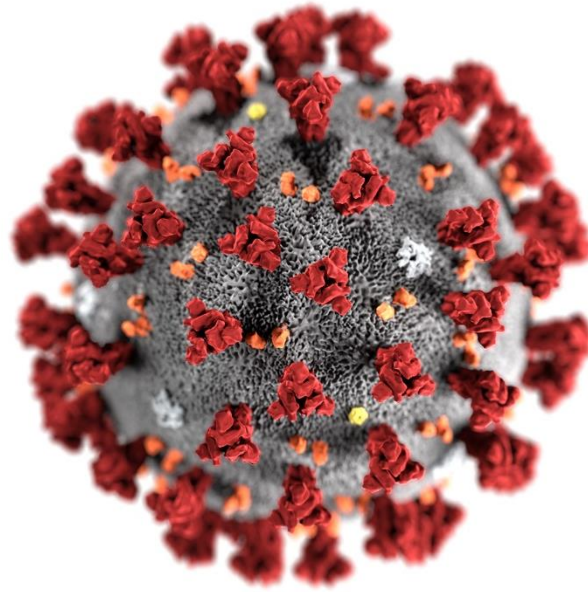

COVID-19

STANDARD OPERATING PROCEDURES

This is a living document and will be updated as necessary

In accordance with General Dental Council advice, the decisions made in this document are primarily based on national guidance from Public Health England (PHE)

Revision date: 1 November 2020. Version 5

Cavendish House Dental Care

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Introduction

The following document details the plans for the dental treatment of patients during the COVID-19 pandemic. These plans will ensure that Cavendish House Dental Care is able to care for our patients and staff safely and confidently.

The protocols in this document aim to dispel any staff member or patient concerns on safety using sound, evidence-based practice, and Public Health England (PHE) national guidelines. Other guidelines from the British Dental Association (BDA), Chief Dental Officer (CDO) and Faculty of General Dental Practice (FGDP) have also been consulted.

Implementing strict infection control protocols for the safety and welfare of patients and staff members has always been standard procedure at Cavendish House. In the current crisis, the practice has implemented additional procedures and protocols.

Background

In late 2019 a new strain of coronavirus was identified, which has been named SARS-CoV-2. This virus is responsible for Coronavirus Disease 2019 (COVID-19), which was declared a pandemic on 12th March 2020.

Clinical symptoms range from a mild-to-moderate illness, to pneumonia or severe respiratory infection and death. Loss of the sense of smell and taste are also recognised as additional symptoms.

There is no current vaccine to prevent COVID-19.

We will be following the most updated general national guidance (https:www.gov.uk/coronavirus) by:

1. Issuing stay at home guidance for households with possible COVID-19
2. Social distancing
3. Shielding vulnerable groups of patients (APPENDIX I)
4. Shielding vulnerable groups of colleagues (APPENDIX I)

Cavendish House has invested in new equipment and PPE to ensure that patients are treated safely, and staff are able to work in a safe environment in accordance with Care Quality Commission (CQC) and General dental Council (GDC) regulations.

These Standard Operating Protocols (SOP) will be continually monitored and updated as necessary. The SOP is a living document.

Cavendish House Dental Care

Reducing risks

The two main increased risks in dentistry with the COVID-19 pandemic occur because COVID-19 is a transmissible virus. These risks are:

1. Close physical contact (within 2 metres) of Dentists, Dental Care Professionals (DCP), reception staff, administration staff and patients, as well as contact between patients inside the Practice.
2. Potential for increased risk of contact with droplets via surface contamination and aerosol as many dental procedures are aerosol generating. These are referred to as Aerosol Generating Procedures (AGP).

The Cavendish House Dental Care Standard Operating Procedures' (SOP) focus is to reduce these risks by:

1. Reducing person to person contacts
2. Reducing the risk of transmission via droplet and aerosol
    - The evidence supporting the risk of transmission for some of these routes is scientifically uncertain, but it is currently sensible to believe that transmission via these routes is likely.
    - The main methods by which we can reduce the rate of transmission of droplets and aerosol are:
        a. **Reduction of production**: reducing the number of AGP procedures, high volume suction, rubber dam, etc.
        b. **Reduction of transmission of viral load by aerosol:** e.g. air purification, ventilation, thorough cleaning of surfaces etc
        c. **Reduction of transmission via contact:** e.g. correct use of PPE and a new patient journey.
3. Risk assessing every AGP before commencing treatment using the **FGDP toolkit**. The risk assessment is recorded for every patient. The required PPE, risk mitigating factors and room fallow time will be dependent on the current guidelines and will consider:
    a. The COVID-19 Alert Level (1-5)
    b. The Patient's Risk Assessment (patient health, BAME status etc)
    c. The Procedure AGP Risk Assessment (Low, Medium or High)
    d. The Mitigating Factors employed before, during and after the patient attendance.

Concerns

As guidance is evolving fast this is a living document and content will be updated as required.

Safety for all is based on the evidence at hand. At this point in time, real scientific evidence relating to actual risks to dental teams is sparse and often anecdotal. Potential exposure to the virus is high due to the nature of the profession.

These practice procedures consider each element as a layer in the overall limitation of risk.

Cavendish House Dental Care

Standard Operating Procedures (SOP)

The decisions made in the SOP are based on the national guidance across the four home nations and upon scientific evidence, especially that published by Public Health England (PHE).

Pre-Practice Attendance Preparation:

Pre-assessment of colleagues: APPENDIX II

- Risk assessment of all staff members prior to work to ensure that they are available to return to work, do not fall into vulnerable worker groups, are not living with anybody with confirmed or suspected COVID-19 and are asymptomatic from COVID-19 symptoms

Pre-preparation of the Practice Environment: APPENDIX III

- Most dental treatment will require closer contact than the recommended 2 metres, however social distancing measures should be applied as far as possible throughout the Practice.
- Physical distancing measures will need to be implemented within the Practice environment in advance of accepting patients and visitors.

Management of the Appointment Diary:

- The appointment diary will need to be managed in a different way to allow for social distancing, enhanced disinfection procedures, and allocation of AGPs.
- Zoning and surgery rotation may need to be implemented.

Screening and Triaging of Patients: APPENDIX IV

All patients must be screened and triaged remotely by telephone and/or video link before presentation at the practice.:

- To risk assess patients for their possible COVID-19 history and symptoms
- Identify vulnerable/shielding patient groups and manage the diary accordingly.
- To confirm if the patient requires a clinical triage call before the appointment.
- To confirm any medical history changes.
- To confirm contact details, email and phone numbers.

- To clarify and prepare patients for the altered patient journey at their appointment.

Clinical triaging should be performed to confirm the purpose of the appointment and allow optimal surgery preparation.

This needs to be reviewed again, ideally 24 hours or less, before the scheduled appointment. A screening Medical History and COVID-19 risk assessment is sent electronically to every patient at least 24 hours before their appointment, via the practice's EXACT patient management computer system.

Patients are COVID-19 risk assessed again on entering the practice, before leaving reception

Patient Practice Attendance Protocol : APPENDIX V

- Alterations will be necessary to the usual attendance protocols for patients and visitors
- This will need to be communicated to the patient and any visitors during the pre-attendance screening phase

People numbers in Surgery:

- All procedures should be carried out with a single patient and **only** staff members who are needed to undertake the procedure present in the room with the doors **closed.** Windows can be opened during the procedure to improve room ventilation.
- If an AGP is being undertaken no-one should enter the room. Door signage warns anybody outside the room that a AGP is underway and not to enter.

Colleague preparatory measures:

Hand and respiratory hygiene

All members of the Cavendish House Dental Care team, along with patients and visitors, should decontaminate their hands using alcohol-based hand rub (ABHR) when entering and leaving the practice. This should be followed by hand washing at the nearest available facility. ABHR facilities are in the patient waiting area and on the upstairs landing. These facilities are clearly signed.

Hand hygiene

For staff members, hand hygiene (washing with soap and water and/or ABHR) must be carried out at all of the following times:

- Immediately before every episode of direct patient care, to including forearms
- Prior to donning PPE
- After any activity or contact that potentially results in hands becoming contaminated
- After the removal of personal protective equipment (PPE)
- After equipment decontamination
- After waste handling.
- At the end of every clinical session, to include forearms

Respiratory and Cough Hygiene

All staff members and patients and visitors should follow good respiratory and cough hygiene:

“Catch it, bin in, kill it”

Pre-preparation of the Surgery Environment: APPENDIX VI

- It is recognised that dental treatment will require closer contact than the recommended 2 metres, however social distancing should be applied as far as possible throughout the process.
- Physical measures will need to be implemented to prepare the surgery environment in the advance of accepting patients.
- Treatments must be planned in advance so as to maximise surgery safely and efficiency especially with regard to enhanced PPE preparation.

Cavendish House Dental Care

Clinical Protocols

Standard Infection Control Precautions: (SICPs)

- Standard national infection control precautions (SICPs) should always be adhered to .
- The Cavendish House Dental Care COVID-19 SOPs builds upon these; they do not replace them.

Enhanced Transmission-Based Precautions: (ETBPs)

- These are applied in the document as SICPs but are considered by Cavendish House Dental Care not to be sufficient alone during this pandemic
- **Contact Precautions** are used to prevent and control infection transmission via direct contact or indirectly from the immediate environment. This is the most common route of transmission.
- **Airborne precautions** are used to prevent and control infection transmission via aerosol (<5µm) from the respiratory tract and saliva of the patient directly onto a mucosal surface or conjunctivae of the dental staff members or next patient.
- **Droplet precautions** are used to prevent and control infection transmission over short distances via droplets (>5 µm) from the patient to the mucosal surface or conjunctivae of the dental team or next patient.

Definition of a Treatment Session

- A treatment session is the length of time from the start of a clinical session until the need to remove workwear, to eat food, or after 4.5 hours, whichever is the soonest.
- Examples are 9am-1.30pm and 2pm-6.30 pm.
- The types of treatment session will also dictate the type of PPE that will be required

Infection Prevention Control Procedures

- Reduction in production of AGP.
- Reduction in number of social contacts – social distancing.
- Reduction in contact transmission – decontamination and appropriate PPE.
- Reduction in droplet transmission – appropriate PPE.
- Reduction in aerosol transmission – air circulation, air purification (APPENDIX VIII), appropriate PPE.

Aerosol reduction measure

- Alteration in working practice to reduce numbers of AGPs
- Routine use of rubber dam unless this is not practicable
- Avoid patients rinsing or spitting into sinks, unless essential

Patient PPE for non-AGP and AGP

- Well-fitting safety goggles, to be disinfected and alternating pair per patient as first pair are being disinfected.

Personal Protective Equipment (PPE): APPENDIX VII

Many dental procedures may create an AGP.

If staff members are confident that a non-AGP can be carried out, then the standard Cavendish House Dental Care PPE (with apron and full face visor) is acceptable.

For an AGP, Enhanced Cavendish House Dental Care COVID-19 PPE is applicable.

Please see the following table for clarification.:

Cavendish House Dental Care

	Reception No clinical treatment	Standard PPE Dental Surgery Non AGP	Enhanced PPE Dental Surgery Treatments with AGP	Standard PPE Decon Room
Good Hand Hygiene	Yes	Yes	Yes	Yes
Disposable Gloves	No	Yes	Yes	Yes
Disposable Plastic Apron	No	Yes	No	Yes
Disposable Fluid Resistant Gown	No	No	Yes	No
Disposable Fluid Resistant Cap	No	No	Yes – for High Risk	No
Shoe covers	No	No	Yes – for High Risk	No
Fluid Resistant Surgical Mask (FRSM)	YES	Yes, sessional use permitted	No	YES
FFP2 or FFP2 Mask	No	No	Yes – FFP2/3 or half face P3	No
Visor	No	Yes**	Yes**	Yes**

*Reception is protected with acrylic screening at a height of 1m above the counter top and an acrylic partition between the receptionists. Facemasks must be worn by all staff (clinical and non-clinical) at all times other than when eating or drinking. A dedicated hand sanitiser is positioned on the wall in the reception area for reception staff.

**Regular prescription glasses or loupes are not considered adequate eye protection when a FFP2/3 mask is worn for an AGP. They should be worn under a full face visor (forehead to chin).

Cavendish House Dental Care

Workwear Management: APPENDIX XIV

It is important that all dental staff members wear appropriate clothing at work and follow the guidance for laundering

- Workwear should not be worn to the practice or outside the practice after use.
- Staff members must keep clinical and outside clothing separated.
- It is expected that workwear will be the standard scrubs or trousers and tunics.
- The transportation, management and hygiene of workwear should follow the workwear policy.
- Facemasks must be worn by all staff at all times unless eating or drinking

Donning and Doffing: APPENDIX XI

The wearing of Enhanced Cavendish House Dental Care PPE should be Donned (put on) and Doffed (taken off) in line with the Donning and Doffing protocol.

FFP2/P3 masks should be removed outside the dental surgery where AGPs have been undertaken in line with doffing protocol.

Decontamination Process:

The decontamination process after non-AGP should follow normal national cross infection control guidelines, reflecting the pre Covid-19 Cavendish House Dental Care policy (APPENDIX XII)

The decontamination process after AGP should follow the Cavendish House Dental Care Decontamination AGP policy (APPENDIX XIII)

Part of the decontamination process may involve air purification using the installed air purification units to reduce surgery downtime. The time requirements for post AGP fallow are calculated for each individual patient using the FGDP calculator. This has been customised for the size of each individual surgery.

Cleaning of Communal areas for staff members:

Modified cleaning procedures will be necessary for cleaning of communal areas regarding products used and processes followed.

Areas should be cleaned with detergent and disinfectant unless there has been a bloody/body fluid spill which should be dealt with immediately using the Spillage Kit.

Cavendish House Dental Care

COVID PROTOCOLS

PATIENT JOURNEY AND STANDARD OPERATNG PROTOCOLS

The number of patients permitted in the practice is limited to ensure that 2m distance can be kept between all persons. The waiting area has been redesigned to allow patients to sit 2m away from each other. The entire waiting area can hold a **maximum of 7 patients** under this arrangement.

Patients must contact the practice by telephone or email. This allows the practice to control the patient numbers. The entrance door is electronically locked. Patients must use the video link at the door to request entrance from the reception. The door is electronically unlocked remotely by reception.

All patients will be triaged by telephone and/or video link. A COVID-19 risk assessment is carried out in accordance with current government guidelines. If appropriate, an appointment time is given.

Medical History Forms will be completed by the patient remotely. If completed on paper this will be shown to the dentist/hygienist in the surgery whilst the Medical History is being discussed and recorded. The paper forms will not be touched by any Practice personnel and will be taken back home by the patient.

Patients are asked not to bring anybody else into the practice with them unless that is essential (carers, parents, guardians etc).

Patients will not be permitted to enter the Practice until the main door is remotely unlocked by reception following confirmation of the patient's name using an audio video link. Patients must not arrive more than 10 minutes before their appointment. 'Walk-ins' are not permitted.

1. PATIENT ATTENDANCE

On arrival the patient will message reception using the door video link. If appropriate, the reception will remotely unlock the door. The patient will immediately be directed by signage to the reception. The reception is screened with acrylic screening on all sides. The screening is 1m in height, above the countertop.

If patients are queuing, signage directs them to keep a distance of 2m from each other.

Once the surgery is ready the patient will be called by name from the waiting area by a member of the clinical staff. The escorting staff member will be wearing appropriate PPE (face mask and full face visor).

Cavendish House Dental Care

2. SURGERY PROTOCOLS

All surfaces in the dental surgery will be kept clear. All wall art has been removed.

Dentist and nurse will wear appropriate PPE, including FRSM and visor for the examination. Scrubs with a disposable apron will be worn by all clinical personnel.

The scientific evidence, published in the Journal of Evidence Based Medicine and carried out by the Centre for Evidence Based Medicine, and PHE guidance has shown that for standard none-aerosol generating procedures, standard 3-ply surgical masks are as effective as respirator masks.

If an AGP is required, clinicians will treat the patient under the Aerosol Generating Procedures protocol. All clinical personnel must wear:

- Full length fluid resistant gown (covering arms). Single patient use only.
- FFP2 or half mask P3 (all personnel must be fit tested for each specific mask). Sessional use is permitted.
- Shoe covers (for High Risk). Single patient use only.
- Hair cap (for High Risk). Single patient use only.
- Gloves. Single patient use only.
- Full face visor. Disposed of or disinfected after each AGP.

After each AGP patient, cleaning down of surfaces will be carried out in accordance with the AGP Protocols (APPENDIX XIII)

The air will be fully cleaned before another patient can enter the surgery. With the installed approved air purifiers the time required will be determined using the FGDP Fallow Time Calculator.

3. PATIENT EXIT

The patient will be directed to the acrylic screened reception after completion of their appointment.

Patients checking in will be separated from patients checking out. A distance of 2m will be kept between patients. Patients will check in on the left side of reception (side closest to the entrance door) and will check out on the right side of reception.

Patients time during checkout will be minimised as much as possible. If extensive courses of appointments need to be booked the patient will be asked to telephone (or reception will telephone the patient) after they leave the Practice.

Treatment plans, treatment estimates and receipts will be sent to the patient by email, unless this is impossible.

Only contactless or card payments will be accepted, unless this is not possible.

Cavendish House Dental Care

AEROSOL GENERATING PROCEDURES

COVID-19 STANDARD OPERATNG PROTOCOLS

COVID-19 protocols are essential to ensure that our patients can receive vital dental healthcare in a safe and caring environment.

General principles:

1. Avoid aerosol generating procedures (AGP) whenever practicable. When unavoidable the duration is reduced as much as is practicable.
2. AGPs can be created by the high speed drill, ultrasonic scalers, the 3-in-1 or patient behaviour (coughing and sneezing)
3. Employ methods to reduce the effect of AGPs by using high volume suction, four handed dentistry and rubber dam.
4. Use recommended PPE and the described procedures

Procedures that may result in aerosols:

1. 3-in-1 unit when air and water are used together at the same time
2. High speed drill (air rotor)
3. Electric handpieces with irrigation
4. Surgical/implant drills with irrigation
5. Ultrasonic handpieces
6. Rotary instruments used outside the mouth on contaminated surfaces (e.g. lost crowns)
7. Air abrasion
8. Polishing after a hygienist scale
9. Rinsing or spitting into a spittoon
10. Any procedure that may induce coughing/gagging

In the event of an aerosol generating exposure (AGE) or an aerosol generating procedure (AGP) a full risk assessment is carried out (APPENDIX XVI). Treatment is performed according to the Overall Risk Assessment (APPENDIX XVI) using the following protocols to protect patients and staff:

1. WATER SUPPLY

Suitable disinfectant solution is added to the closed system water supply used in the surgery. Bacterial testing is carried out on all water lines prior to the practice reopening, owing to stagnation during the weeks of closure.

Cavendish House Dental Care

2. RUBBER DAM

Rubber dam is used for every patient unless it is not possible to do so.

3. PPE

Clinical staff will wear the following PPE:

- Full arm fluid repellent gown, over scrubs. Single use only.
- Face shield/full face visor. Single use or disinfected between patients.
- FFP2 or P3 mask/respirator.
- Gloves. Single use only.
- Disposable head cover (High Risk). Single use only.
- Disposable shoe covers (High Risk). Single use only.

4. AIR PURIFICATION

Air purification systems have been proven to effectively remove pathogens in the air, and ensure that airborne, droplet viruses, such as COVID-19 are neutralised before they are inhaled. This established technology is used widely in hospitals and clinics worldwide.

Each surgery has a IQAir HealthPro 250 Air Purifier installed. The FGDP Fallow Time Calculator is used to determine the required machine running time. Each surgery has been measured using a laser measuring device to determine the room volume. This data is held, for each individual surgery, within the FGDP Fallow Time Calculator account for the Practice.

5. HIGH VOLUME ASPIRATION

High volume aspiration (HVA) will be used for all AGPs. This allows 99.9% of all potentially hazardous materials to be safely removed.

Spitting must be minimised and allowed only if necessary. All staff must stand away from a patient who is spitting (at least 2m).

6. CLEANING THE SURGERY & EXIT PROTOCOL

After each AGP patient, cleaning down of surfaces and flooring is carried out with the use of a detergent combined with a chlorine releasing solution in accordance with the Overall Risk Assessment (APPENDIX XVI)

Only contactless or card payments will be accepted unless this is impossible.

Cavendish House Dental Care

APPENDIX I

CATEGORIES OF PATIENTS AND VULNERABLE GROUPS

COVID-19 STANDARD OPERATNG PROTOCOLS

CATEGORY 1 PATIENTS ARE THOSE:

1. With a confirmed case of COVID-19
2. Living in the same household as somebody with COVID-19 symptoms/confirmed diagnosis of COVID-19
3. Having COVID-19 symptoms

CATEGORY 2 PATIENTS (VULNERABLE GROUPS) ARE:

HIGH risk-

- have had an organ transplant
- are having chemotherapy or antibody treatment for cancer, including immunotherapy
- are having an intense course of radiotherapy (radical radiotherapy) for lung cancer
- are having targeted cancer treatments that can affect the immune system (such as protein kinase inhibitors or PARP inhibitors)
- have blood or bone marrow cancer (such as leukaemia, lymphoma or myeloma)
- have had a bone marrow or stem cell transplant in the past 6 months, or are still taking immunosuppressant medicine
- have been told by a doctor they you have a severe lung condition (such as cystic fibrosis, severe asthma or severe COPD)
- have a condition that means they have a very high risk of getting infections (such as SCID or sickle cell)
- are taking medicine that makes them much more likely to get infections (such as high doses of steroids)
- have a serious heart condition and are pregnant

MODERATE risk-

- are 70 or older
- are pregnant
- have a lung condition that's not severe (such as asthma, COPD, emphysema or bronchitis)
- have heart disease (such as heart failure)
- have diabetes
- have chronic kidney disease
- have liver disease (such as hepatitis)
- have a condition affecting the brain or nerves (such as Parkinson's disease, motor neurone disease, multiple sclerosis or cerebral palsy)
- have a condition that means they have a high risk of getting infections
- are taking medicine that can affect the immune system (such as low doses of steroids)
- are very obese (a BMI of 40 or above)

CATEGORY 3 PATIENTS ARE:

All patients under the age of 70 and who do not fall into either of the above categories

APPENDIX II

RISK ASSESSMENT OF STAFF

COVID-19 STANDARD OPERATNG PROTOCOLS

All team members will be risk assessed to ensure that they do not fall into vulnerable groups and have no COVID-19 symptoms

For ongoing guidance see the government information at:

https://www.gov.uk/government/publications/covid-19-stay-at-home-guidance

APPENDIX III

THE PRACTICE ENVIRONMENT

COVID-19 STANDARD OPERATNG PROTOCOLS

1. A distance of 2m should be kept between patients wherever possible
2. Appropriate signage will advise patient of the 2m distance rule
3. A distance of 2m should be kept between staff members wherever possible
4. Staff training will be given on these SOPs prior to staff starting clinical work
5. A distance of 2m should be kept between patients and staff wherever possible
6. Waiting areas are clearly demarked to ensure the 2m separation between patients
7. The waiting area can take 7 patients with full 2m distancing
8. Patients are asked not to bring anybody else into the practice unless essential to be accompanied (parents, carers etc)
9. Patient numbers are to be limited to 12 inside the practice at any one time (5 in the surgeries and 7 in the waiting areas)
10. All patient magazines must be removed
11. All wall art must be removed from surgeries
12. No pens are to be shared with patients or amongst staff
13. Medical history forms are completed by patients online before their appointments and shown to the dentist/hygienist on entering the surgery. If not done, the medical history is taken by the dentist orally from the patient in the surgery.
14. COVID-19 information posters are to be clearly displayed in all areas of the practice
15. The water dispenser must be removed
16. Frequently used hand touch areas and common areas such as the waiting area and reception are to be disinfected at least twice a day.
17. All door handles must be disinfected regularly
18. All exit and entrance doors must be kept locked.
19. Air purification units are to be installed
20. PPE donning must take place either in the DR or the downstairs holding room (separate to treatment areas)
21. The appointment book must be managed into AGP or non AGP sessions
22. Home clothes are never to be worn in the surgery (immediately change upon entering the building)
23. Break times and rotas are to be organised to ensure that the 1m distance rule can apply at lunch and other rest times

Patient-use hand sanitiser stations have been installed upstairs and downstairs in the patient areas

Cavendish House Dental Care

APPENDIX IV

TRIAGE & SCREENING OF PATIENTS

COVID-19 STANDARD OPERATNG PROTOCOLS

Before an appointment is offered all patients are triaged either by telephone and/or video call

1. The patient is risked assessed regarding COVID-19 symptoms
2. The patient is risk assessed regarding Vulnerable Groups
3. Patients in Category 1 will not be seen in the practice. These patients may be referred to the local Urgent Dental Centre (UDC)
4. Email addresses must be confirmed. The practice will aim to be paperless regarding estimates, receipts and consent.
5. Patients are not to arrive too early (more than 10 minutes before their appointment) and to wait in their car (or outside the practice if the patient has travelled by other means)
6. The new Patient Journey will be explained to the patient. This will be followed by an email to the patient clarifying the new Patient Journey
7. Payment must be contactless (credit/debit card, contactless card or Apple Pay) where possible.
8. Patients are asked to use their toilet before leaving home to reduce the number of people using the practice toilet
9. To ask the patient not to bring any belongings with them (with the exception of handbags etc) into the surgery if possible

Pre-attendance COVID-19 risk assessment

1. The patient is contacted 24 hours before appointment to confirm attendance and to confirm any changes in their medical history.
2. Patient is asked whether they have experienced any of the symptoms of COVID-19. These are:
    a. A high temperature.
    b. Persistent cough, this means coughing for more than an hour, or 3 or more coughing episodes in 24 hours.
    c. A loss or change to their taste or sense of smell
3. Patients asked whether they have been in contact with any persons who have been unwell with or have exhibited the symptoms of COVID-19

If any of these symptoms are noted, the appointment should be deferred.
The patient will need isolation for a minimum of 7 days.

If the patient develops any of these symptoms between the screening call and the appointment, they should be told to contact the surgery and postpone the appointment.

CATEGORY 2 (VULNERABLE) PATIENTS MUST BE TREATED AT THE BEGINNING OF THE DAY WHENEVER POSSIBLE AND SHOULD BE KEPT AWAY FROM STAFF MEMBERS AND OTHER PATIENTS AS MUCH AS IS PRACTICABLE

At least 24 hours before their appointment every patient is contacted to:

1. Ask for any changes in their COVID-19 risk status
2. Advise the patient that if they think that their risk status changes between this pre-appointment screening and the appointment to contact us before entering the practice

APPENDIX V

PATIENT ATTENDANCE PROTOCOL

COVID-19 STANDARD OPERATNG PROTOCOLS

1. The patient must use the audio video buzzer at the entrance door to contact reception before entering. Reception will confirm the patient's name and confirm that the patient's appointment is not more than 10 minutes away. If these are confirmed, and the maximum number of patients has not been exceeded inside the Practice, the reception will remotely unlock the door to allow the patient to enter the Practice. If a patient has arrived too early, does not have an appointment or the number of patients inside the practice has exceeded the maximum number, the patient will be asked to wait before being permitted entrance.
2. Patients should not attend with anybody else unless the other person is a parent/carer etc and their attendance is essential.
3. Patients are asked not to bring anything but essential belongings (handbag etc)
4. Patients are asked to use the wall mounted hand sanitiser immediately after entering and before leaving the Practice
5. Patients are asked to comply with the 2m social distancing protocol
6. Reception staff will sit behind the acrylic protective screens
7. Facemasks will be available for patient use.
8. Reception will repeat the COVID-19 risk assessment questions
9. If the patient needs to wait, they will be directed to a specific seat to ensure distancing (2m)
10. If the patient can be escorted directly to the surgery this is preferable to requiring them to wait
11. Should there be a risk that the patient may need to use the toilet during an AGP they will be asked to use the patient toilet before treatment commences. The door handle and flushing lever must be disinfected after use.

APPENDIX VI

SURGERY PREPARATION BEFORE AN AEROSOL GENERATING PROCEDURE

COVID-19 STANDARD OPERATNG PROTOCOLS

1. All treatment must be well planned beforehand
2. All open shelving has been removed
3. All work surfaces must be clutter-free
4. Only essential items must be allowed on a work surface (instruments for the procedure and computer equipment)
5. Keyboards and computer mice are all waterproof. These must be disinfected after each procedure
6. Computer monitors must be disinfected after every procedure
7. All patient leaflets and pictures must be kept in closed cupboards
8. Wall art must be removed from all surgeries
9. Where reasonably practicable, draws should not be opened during a procedure
10. Where reasonably practicable, all items in drawers must be kept either in lidded containers or in sealed pouches
11. No additional person must enter the AGP room unless fully donned in the appropriate enhanced PPE
12. PPE should be doffed (with exception of the FFP2/3 mask) before any staff member leaves the surgery
13. FFP2/3 masks are doffed outside of the room in which an AGP was carried out
14. Clear signage is displayed on the outside of the surgery door.

APPENDIX VII

PPE REQUIREMENTS

COVID-19 STANDARD OPERATNG PROTOCOLS

NON AGP TREATMENT (including runners and decontamination room)

- Scrubs
- Disposable plastic apron (changed after each patient)
- Disposable gloves (changed after each patient)
- 3-ply surgical mask (FRSM) (sessional use permitted)
- Full face visor or glasses (disposed of if single use or disinfected if multiple use in-between each patient)

AGP TREATMENT (Enhanced PPE) – depending on Overall Risk (APPENDIX XVI)

- Scrubs
- Disposable shoe covers (High Risk)
- Disposable fluid resistant gown (changed after each patient)
- Disposable head covering (High Risk)
- Disposable gloves (changed after each patient)
- FFP2/3 mask (sessional use permitted) or half face reusable P3 mask (disinfected after each patient)
- Full face visor (disposed of if single use or disinfected if multiple use in-between each patient)

ALL PPE MUST BE DISPOSED OF IN THE CLINICAL WASTE

Cavendish House Dental Care

APPENDIX VIII

AIR PURIFICATION

COVID-19 STANDARD OPERATNG PROTOCOLS

Each surgery has the following Air Purifiers installed: If the Air Purifier is not functioning, the windows of the surgery must be left open and the room left for 30 minutes.

Machine running time is determined for each individual surgery and for each individual procedure using the FGDP Fallow Time Calculator.

IQAir HealthPro 250 Air Purifier

- World's No. 1 Rated Air Purifier
- Certified Performance
- Hospital-grade COVID-19 filtration
- 100% Ozone Free
- Advanced Gas and Odour Removal
- Extra-Long Filter Life
- Intelligent Filter Life Monitor
- Low Energy Consumption
- Swiss Made

Air quality is tested with the IQAir electronic measuring device:

Cavendish House Dental Care

APPENDIX IX

STAFF TRAINING

COVID-19 STANDARD OPERATNG PROTOCOLS

Before returning to patient care all staff must undergo formal training. The training will be logged for each staff member. The training requirement is mandatory.

Training will be provided on:

1. The COVID-19 virus: aetiology, virulence and pathogenicity
2. Placement of the FFP2/3 masks (all staff must be face fit tested)
3. Donning and doffing PPE
4. The COVID-19 SOPs
5. Decontamination procedures
6. The new Patient Journey
7. New AGP procedures
8. COVID-19 risk assessments
9. Use of the Air Purification system
10. Home and work clothing management
11. Impact of COVID-19 on CPR and AED procedures
12. Appointment management
13. Social distancing for patient and staff
14. Staff risk assessment and risk management

Cavendish House Dental Care

APPENDIX X

Face Fit Testing

COVID-19 STANDARD OPERATNG PROTOCOLS

All clinical staff must have Face Fit Testing carried out before being able to use any FFP2/3 mask or any half face P3 respirator. This is a legal requirement under COSHH.

All staff must be retested if there is a change in the manufacturer or mask type.

Face Fit Testing must be undertaken with any glasses/loupes that would normally be worm by the staff member

If a staff member does not pass a Face Fit Test, alternative FFP2/3 or P3 respirators will be sourced.

If a staff member fails the Face Fit Test for all available masks that staff member must not take part in any AGPs.

Face Fit Testing must be conducted by a trained and certified tester.

Cavendish House Dental Care

APPENDIX XI

Donning and Doffing

COVID-19 STANDARD OPERATNG PROTOCOLS

Prior to donning PPE, the following should be carried out:

1. Consider needing a comfort break
2. Ensure hydration is long session ahead
3. Hair should be tidy and tied back
4. Jewellery should be removed
5. Ensure hand hygiene has been carried out
6. Gather necessary PPE
7. Plan where to put on and take off the PPE
8. Have a colleague help if required or use a mirror if available.

DONNING PPE FOR A NON-AGP: - Putting on PPE

1. Hand hygiene
2. Apron
3. FRSM (adapt to bridge of nose)
4. Eye protection/visor
5. Gloves

DOFFING PPE FOR A NON-AGP: - Taking off PPE

1. Gloves – remove gloves grasping the outside of the glove with the opposite glove. Peel off and hold removed glove in the remaining gloved hand. Slide the fingers of the un-gloved hand under the remaining glove at the wrist and peel off. Dispose in clinical waste.
2. Perform hand hygiene with ABHR.
3. Eye protection – remove eye protection, pull away from face using both hands. Decontaminate if reusable using warm soapy water.
4. Apron – untie or break apron ties at neck and let apron fold down on itself, break ties at waist and fold in on itself. Do not touch outside of the apron., Dispose in clinical wastes and perform hand hygiene with ABHR.
5. FRSM – remove facemask, break ties, bottom and then top, and remove by handling ties only. Lean forwards, dispose of in clinical waste.
6. Clean hand and forearms.

DONNING PPE FOR AN AGP: - Putting on PPE

Donning for an AGP should be done in a different room to the AGP room.

Procedure:

1. Put on shoe covers
2. Put on gown
3. Put on FFP2 or FFP3 and perform fit check on oneself
4. Put on hat
5. Put on loupes/prescription glasses.
6. Put on visor if not already connected to loupes if used
7. Put on gloves (over cuff of the gown)

DOFFING PPE FOR AN AGP: - Taking off PPE

Procedure.

1. Remove gloves as above and dispose of in clinical waste.
2. Perform hand hygiene with ABHR.
3. Remove shoe coverings and dispose of in clinical waste.
4. Perform hand hygiene with ABHR.
5. Remove visor, if separate, tilting head forwards as visor nay have contaminants on it.
6. Place visor in container for decontamination.
7. Remove gown – peel off and roll inside out and dispose of in clinical waste
8. Remove cap and dispose of in clinical waste.
9. Perform hand hygiene with ABHR.
10. Remove loupes
11. Perform hand hygiene with ABHR or soap and water.
12. Leave the surgery.
13. Remove FFP2/3 mask form behind and dispose of in clinical waste.
14. Perform hand hygiene with ABHR or soap and water.

APPENDIX XII

Disinfection Procedure post non-AGP

COVID-19 STANDARD OPERATNG PROTOCOLS

Disinfection Procedure post non-AGP

1. Surfaces are disinfected according to standard protocols.
2. Air-condition should be kept on if required.
3. Disposable items that have been used must be bagged as clinical waste.
4. Usual HTM 01-05 and Practice procedures should be followed with standard cross infection control and boxing of dirty instruments.
5. Visors and headbands to be removed and cleaned/wiped with warm soapy water.
6. Doffing of PPE in surgery.
7. Transport dirty box to decontamination/sterilisation room.

Cavendish House Dental Care

APPENDIX XIII

Disinfection Procedure post AGP

COVID-19 STANDARD OPERATNG PROTOCOLS

Disinfection Procedure post AGP

The DCP/staff member should carry out the following disinfection process after an AGP. PPE to be left on.

1. Windows closed
2. Air-conditioning turned off.
3. Disposable items that have been used must be bagged as clinical waste.
4. Usual HTM 01-05 and practice procedures should be followed with standard cross infection control and boxing of dirty instruments.
5. Visors and headbands to be removed and cleaned/wiped with warm soapy water.
6. Disinfection of water and suction lines, flush though handpieces, 3 in 1 line with appropriate disinfection solution.
7. The disinfection process will involve the staff member cleaning/wiping the surfaces and floor with virucidal agents. These are described below
8. Using disposable cloths or paper rolls/reuseable mop heads the staff member should clean and disinfect the following. .
    a. Clean all reusable equipment and surfaces.
    b. Chair light.
    c. Chair, both top and base.
    d. Foot pedals.
    e. Stools.
    f. Outside of any material containers used during the procedure.
    g. When cleaning surfaces work systematically from top or furthest away point.
    h. Wall cabinets, then work surfaces, then base cabinets.
    i. Handles on units/cabinets.
    j. Wall mounted x-ray equipment.
    k. Sharps bins.
    l. Computers
    m. Taps
    n. Hand basins
    o. Paper towel dispenser.
    p. ABHR dispenser and soap dispenser.
    q. Door handle.
    r. Light switches.
    s. Other non-disposable items.
    t. Outside of door handle.

    u. Floor.
9. Dispose of disposable cloths used as clinical waste.
10. Discard detergent/disinfection solutions safely at disposal point.
11. Air purification cycle should be used or if not available, surgery fallow time of that determined in the pre-treatment risk assessment to be allowed. Windows to be closed for air purification with filter set to maximum. Windows open if no air purification.
12. Remove PPE as in Doffing protocol above. Mask to be left on at this stage.
13. Perform hand hygiene using ABHR.
14. Transport dirty box to decontamination/sterilisation room.
15. FFP2/2 mask to be left on until staff member has left the room.

Agents to use for disinfection:

The disinfection of surfaces and objects shall be performed using virucidal agents such as Cidalkan wipes or spray, or Jangro Virucidal Cleaner made at the 1:40 dilution (in accordance with manufacturer's instruction.

The disinfection of floors shall be performed using a combined detergent and 1:1000 chlorine releasing solution

Cleaning should, be carried out with disposable towels, cloths, or paper pads and the virucidal agents left on the surface to dry for 5 minutes or as per manufacturer's instructions. These agents should not be washed off.

These specific agents may change periodically depending on availability.

These virusidal products must conform to EN14476

APPENDIX XIV

Workwear policy

COVID-19 STANDARD OPERATNG PROTOCOLS

Daily clothing protocol:

Getting to work:
1. Ideally wear clean clothes
2. Pack two pillowcases and use a washable bag such as a rucksack

At work:
1. Change into workwear
2. Put your hone clothes into one pillowcase
3. Use PPE as needed in above protocols

At break times:
1. No food should be consumed whilst wearing work cloths
2. Change into home clothes to eat
3. You will need a new set of clinical clothes for a second session

Leaving work:
1. Put your work clothes in the other pillowcase
2. Change into your home clothes

Arriving home:
1. Clean your car where your hands came into contact with it
2. Enter you home with minimal contact with the premises
3. Wipe down door with hand sanitiser
4. Place the pillowcase with all work clothes into the washing machine and wash on a 60℃ wash.
5. Wipe down your washing machine with a sanitiser wipe after placing the washing inside
6. Wash your hands with hot soapy water.

Cavendish House Dental Care

APPENDIX XV

Legionella Disease Prevention

COVID-19 STANDARD OPERATNG PROTOCOLS

Because our building was closed during the coronavirus (COVID-19) outbreak, water system stagnation can occur due to lack of use, increasing the risks of Legionnaires' disease.

In order to minimise the risk, the following procedures were carried out, and recorded:

1. Hot and cold water outlets fully flushed to prevent water stagnation
2. Prior to commencement of patient care all surgery water systems (DUWLs) were tested with Red Samplers
3. If any DUWL failed the Red Sampler test, the entire system would be disinfected with Alpron™.

Cavendish House Dental Care

APPENDIX XVI

Risk Assessments

COVID-19 STANDARD OPERATNG PROTOCOLS

All patients will be subjected to a thorough personalised Risk Assessment, based on the principles of the stratified risk management processes illustrated in the FGDP(UK) guidance, ‘Implications of COVID-19 for the safe management of general dental practice: A practical guide’.

The risk assessments are recorded in the clinical records by the treating practitioner.

The risk assessments will include:

1. The current national COVID-19 Alert level (1-5)
2. The patient’s risk of developing more serious complications from COVID-19 (low/medium/high)
3. The AGP risk of the procedure (low/medium/high)

Patient Risk Assessment

The personalised risk assessment of the patient will consider the following matters:

- COVID-19 screening
- Age of the patient (higher risk if >70)
- Sex of the patient (males are higher risk than females)
- Health of the patient (see APPENDIX I)
- Ethnicity of the patient (BAME group is a higher risk)
- Whether or not the patient is/maybe pregnant

Procedure AGP Risk Assessment

The AGP risk assessment of the dental procedure will consider the following matters:

- Length of time of the AGP activities (longer is higher risk)
- Nature of the AGP (e.g. high-speed handpiece higher risk than slow speed)

- Mitigating factors (use of rubber dam, high volume aspiration etc)
- PPE worn by clinicians

Overall Risk Assessment

After consideration of the above factors the clinician will determine, and record, the overall risk assessment for the procedure (low/medium/high).

The following protocols will be employed, depending on the overall risk level: -

HIGH RISK

- Enhanced PPE (FFP2/3 mask, gown, full face visor with hair & shoe covers)
- 60 minute fallow time (reduced to 15 minutes if COVID-19 air purifiers are employed)
- Floor mop with detergent and viricidal agent at the end of the procedure
- Surfaces and keyboard/mouse disinfected with detergent and viricidal agent

MEDIUM RISK

- Enhanced PPE (FFP2/3 mask, gown, full face visor +/- hair & shoe covers)
- 30 minute fallow time (reduced to 10 minutes if COVID-19 air purifiers are employed)
- Floor mop with detergent and viricidal agent at the end of the procedure
- Surfaces and keyboard/mouse disinfected with detergent and viricidal agent

LOW RISK

- Standard PPE (FRSM mask, gloves, apron, glasses or full-face visor)
- No fallow time required
- Floor mop with detergent and viricidal agent at the end of each session
- Surfaces and keyboard/mouse disinfected with normal HTM-0105 procedures and materials

We use the FGDP Fallow Time Calculator to determine the fallow time for each individual patient.

Cavendish House Dental Care

APPENDIX XVI I

EVIDENCE BASE FOR PROTOCOLS

COVID-19 STANDARD OPERATNG PROTOCOLS EVIDENCE BASE

FFP2/3 and Half Face P3 Masks

The use of standard masks, FFP2 (N95) masks or FFP3 (N99) masks and their relative effectiveness has been widely debated. Current SOP from NHSE advise the use of FFP3 (N99) masks in all Urgent Dental Care Centres. However for standard, non-aerosol generating procedures, standard 3-ply surgical masks have been shown to be as effective as respirator masks.(1) Furthermore, for non-AGPs, there is no evidence that respirator masks add value over standard masks when both are used with recommended wider PPE measures.(2) In combination with the other measures in these protocols, there is also little benefit or additional protection (0.4%) of FFP3 over FFP2.(15) It makes practical sense based on this evidence to use standard 3-ply surgical masks for non-AGP, and if the other protocols are employed, face fit tested FFP2/3 masks or half face P3 respirators for AGP procedures.

Pre-Screening

The novel coronavirus can be passed from person to person through respiratory droplets. This is significant as symptom-free patients may in theory facilitate transmission in the dental environment. We intend to avoid a Covid-19 positive patient entering the building through pre-arrival telephone questionnaire screening and/or video consultations.

Water Supply Cleaning

The SARS-Cov-2 virus has been shown to remain active and infectious in sewage and waterlines.(8) Hypochlorous Acid based disinfectant has been shown to eliminate biofilms and disinfect the waterlines.(9, 10)

Rubber Dam

The airway, salivary glands and tongue are potential sites for the Covid-19 virus due to the expression of ACE2 proteins in their cell linings to which the virus binds.[11] Rubber dams and high volume suction devices significantly minimise the production of saliva aerosol where high speed hand-pieces and ultrasonic scalers are used.[12]

Visors and Eye Protection

Exhaled aerosol size depends on the characteristics of the fluid, the force and pressure at the moment of emission, environmental conditions and remain suspended in the air for varying amounts of time depending on the particle/droplet size.[13] As such, protective glasses and full face visors are advisable to prevent direct contact of particles and droplets from suspended infectious respiratory particles entering through the eyes.[14]

Gowns

In all settings, when in close patient contact, scrubs with disposable apron should be used and when carrying out aerosol generating procedures, a long-sleeved fluid resistant gown.[16]

Air Purifiers

Ventilation rates, ventilation strategies, air filtration and differential pressure control can contribute to the spread of airborne infectious diseases in hospitals.[17] The NHSE has recommended 30 minute intervals (with open windows) between patients at UDC centres based on the time taken for particle settling.[18] Air purifiers that employ a combination of HEPA filtration, active carbon filtration and UVC can reduce this time dependency on their air turnover ability and the size (volume) of the room.[19-21] Air purifiers measure their ability in volume cycles per hour and modern units can achieve a turnover rate of 10-20x times/hour. Wall mounted units or free-standing units positioned close to the patient's feet can optimise this outcome. [22-26]

High Volume Suction

The use of high-volume evacuation HVE/suction has been shown to reduce aerosol contamination coming from the operative site by 90%.[27]

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